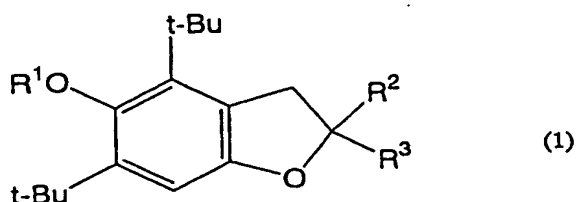


CLAIMS

[1] A pharmaceutical composition for prevention and/or treatment of fatty liver or hepatic disease, which comprises, as an active ingredient, a compound of the formula (1):

[Chemical Formula 1]



where

10  $R^1$  is a hydrogen atom, an acyl group, or an arylalkoxycarbonyl group; and

$R^2$  and  $R^3$  are each independently a substituted or unsubstituted alkyl group, a substituted or unsubstituted alkenyl group, or a substituted or unsubstituted alkynyl group, or  $R^2$  and  $R^3$  may combine to form a cycloalkyl group.

[2] The composition according to claim 1, wherein  $R^1$  is a hydrogen atom.

[3] The composition according to claim 1, wherein  $R^2$  and  $R^3$  are each an unsubstituted alkyl group.

20 [4] The composition according to claim 3, wherein the unsubstituted alkyl group is an n-butyl group, an n-pentyl group, an n-hexyl group, or an n-heptyl group.

[5] The composition according to claim 1, wherein the compound of the formula (1) is 4,6-di-t-butyl-5-hydroxy-2,2-di-n-butyl-2,3-dihydrobenzofuran, 4,6-di-t-butyl-5-

hydroxy-2,2-di-n-pentyl-2,3-dihydrobenzofuran, 4,6-di-t-butyl-5-hydroxy-2,2-di-n-hexyl-2,3-dihydrobenzofuran, or 4,6-di-t-butyl-5-hydroxy-2,2-di-n-heptyl-2,3-dihydrobenzofuran.

5 [6] The composition according to claim 5, wherein the compound of the formula (1) is 4,6-di-t-butyl-5-hydroxy-2,2-di-n-pentyl-2,3-dihydrobenzofuran.

[7] The composition according to claim 1, wherein the prevention and/or treatment of hepatic disease are or is  
10 ascribed to leakage of hepatic enzymes.

[8] The composition according to claim 1, wherein the fatty liver is nonalcoholic fatty liver.

[9] The composition according to claim 1, wherein the hepatic disease is hepatic disease associated with the  
15 fatty liver.

[10] The composition according to claim 9, wherein the fatty liver is nonalcoholic fatty liver.

[11] The composition according to claim 1, wherein the hepatic disease is bacterial or chemical-induced hepatic  
20 function disorder.

[12] The composition according to claim 1, wherein the hepatic disease is chronic or acute hepatitis.

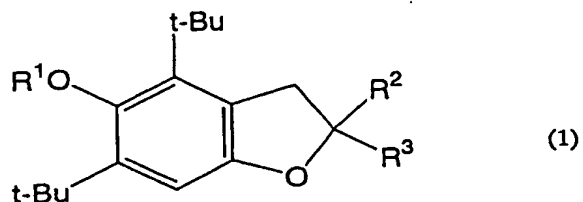
[13] The composition according to claim 12, wherein the hepatitis is viral.

25 [14] The composition according to claim 1, wherein the hepatic disease is hepatic cirrhosis.

[15] The composition according to claim 1, wherein the hepatic disease is liver cancer.

[16] Use of a compound of the formula (1):

[Chemical Formula 2]



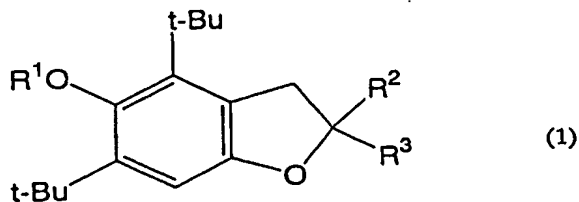
where

5             $R^1$  is a hydrogen atom, an acyl group, or an arylalkoxycarbonyl group; and

$R^2$  and  $R^3$  are each independently a substituted or unsubstituted alkyl group, a substituted or unsubstituted alkenyl group, or a substituted or unsubstituted alkynyl group, or  $R^2$  and  $R^3$  may jointly form a cycloalkyl group, in production of a pharmaceutical composition for prevention and/or treatment of fatty liver or hepatic disease.

[17]        A method for prevention and/or treatment of fatty liver or hepatic disease, comprising administering a compound of the formula (1):

[Chemical Formula 3]



where

20             $R^1$  is a hydrogen atom, an acyl group, or an arylalkoxycarbonyl group; and

$R^2$  and  $R^3$  are each independently a substituted or

unsubstituted alkyl group, a substituted or unsubstituted alkenyl group, or a substituted or unsubstituted alkynyl group, or  $R^2$  and  $R^3$  may jointly form a cycloalkyl group, to a patient in need of such prevention and/or treatment.